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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/091,116	03/06/2002	Heume Il Baek	041501-5489	5138

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EXAMINER

NGUYEN, JIMMY H

ART UNIT PAPER NUMBER

2629

DATE MAILED: 06/09/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b> 10/091,116	<b>Applicant(s)</b> BAEK, HEUME IL	
	<b>Examiner</b> Jimmy H. Nguyen	<b>Art Unit</b> 2629	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☒ Responsive to communication(s) filed on 11 October 2005.  
 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.  
 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 6,8,9,12,14,16-21 and 23 is/are pending in the application.  
 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.  
 5) ☒ Claim(s) 9 and 12 is/are allowed.  
 6) ☒ Claim(s) 18,21 and 23 is/are rejected.  
 7) ☒ Claim(s) 6,8,14,16,17,19 and 20 is/are objected to.  
 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) ☐ The specification is objected to by the Examiner.  
 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  
 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
 a) ☒ All    b) ☐ Some \*    c) ☐ None of:  
     1. ☒ Certified copies of the priority documents have been received.  
     2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
     3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  
 \* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

### DETAILED ACTION

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 05/18/2006 has been entered. Claims 6, 8, 9, 12, 14, 16-21 and 23 are currently pending in the application. An action follows below:

#### *Claim Objections*

2. Claims 6 and 14 are objected to under 37 CFR 1.75(a) because although these claims meet the requirement 112/2d, i.e., the metes and bounds are determinable, however, the following changes should be made:

As to claim 6, "a first power voltage  $V_{DD1}$  and a second power voltage  $V_{DD2}$  for one of a reflective driving mode and a transmissive driving mode;" in lines 3-4 should be changed to -- a first power voltage  $V_{DD1}$  during a reflective driving mode and a second power voltage  $V_{DD2}$  during a transmissive driving mode; --, so as to clarify the claimed invention and to make the claimed invention consistent with the disclosure, i.e., **both** first and second power voltages can't be generated during either a reflective driving mode or a transmissive driving mode.

As to claim 14, "device" in last line should be changed to -- panel --, so as to make the claimed invention consistent with the disclosure, because gamma voltages and common voltages are generated inside the LCD **device**.

It is in the best interest of the patent community that applicant, in his/her normal review and/or rewriting of the claims, to take into consideration these editorial situations and make changes as necessary.

***Claim Rejections - 35 USC § 102***

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

4. Claims 18, 21 and 23 are rejected under 35 U.S.C. 102(b) as being anticipated by Kimura (JP 2000-193936). See the English translation attached in the Office Action dated 3/25/2004, for the following rejections.

As per claims above, the claimed invention reads on Kimura as follows: Kimura discloses a LCD device (fig. 1) comprising a gamma reference voltage generating circuit (an output section 45, see Fig. 2) comprising a DC-to-DC converter (a reference potential generating section 46, see Fig. 2) to generate a first voltage (a voltage is provided to an input terminal A1 of a selection circuit 47, see Fig. 2) and a second voltage (a voltage is provided to an input terminal B2 of a selection circuit 47, see Fig. 2); a switch (a selection circuit 47, see Fig. 2) to select the first voltage in a reflective driving mode of the LCD (see paragraph [0115] of the English translation) and the second voltage in a transmissive driving mode of the LCD (see paragraph [0115] of the English translation); a first common power unit (a unit including a top element 48 and its connections, as shown in Fig. 2) to receive the first voltage via an output terminal "A" of the selection circuitry 47 and output a first common voltage (V0) when the first voltage is

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selected by the switch (47) (note that since the voltage V0 is commonly used for driving all pixels in the LCD panel, the voltage V0 is considered as a common voltage); and a second common power unit (a unit including a second element 48 and its connections, as shown in Fig. 2) to receive the second voltage via an output terminal "B" of the selection circuitry 47 and output the second common voltage (V1) when the second voltage is selected by the switch (47) (note that since the voltage V1 is commonly used for driving all pixels in the LCD panel, the voltage V1 is also considered as a common voltage). See paragraphs [0120] and [0121]. Kimura further teaches the switching unit (47) synchronized with an ON/OFF state of the light source 21 (corresponding to the claimed backlight source) of the LCD (see fig. 1, abstract, page 15, paragraphs [0111] - [0114]). Accordingly, the elements and the steps in the claim are read in the Kimura reference.

#### ***Allowable Subject Matter***

5. Claims 6, 8, 14, 16, and 17 are objected for the reasons above, but would be allowable if rewritten independent claims 6 and 14 to overcome the objections above. See the statement of reasons for the indication of allowable subject matter in the Office Action dated 3/25/2004.

6. Claims 19 and 20 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. See the statement of reasons for the indication of allowable subject matter to claim 6 in the Office Action dated 3/25/2004.

7. Claims 9 and 12 are allowed. See the statement of reasons for the indication of allowable subject matter in the Office Action dated 3/25/2004.

#### ***Response to Arguments***

8. Applicant's argument, see pages 7-9 of the amendment, filed 04/21/2006, with respect to the rejection under 35 USC 102(e) as being anticipated by Kamei et al. (US 5,640,174) in the Office Action dated 01/24/2006, has been fully considered and is persuasive in light of the amendment to independent claim 18. This rejection in the Office Action dated 01/24/2006 is hereby withdrawn.

9. Applicant's argument, see pages 7-9 of the amendment, filed 04/21/2006, with respect to the rejection under 35 USC 102(b) as being anticipated by Kimura in the Office Action dated 01/24/2006, has been fully considered but it is not persuasive. Applicants argue that none of 11 voltages V0-V10 as shown in Fig. 2 of Kimura are common voltages, see page 9, first paragraph, of the amendment filed on 04/21/2006. Examiner disagrees because claim 18 simply defines the common voltages as the voltages outputted from the common power units; therefore, since any of the voltages V0-V10 of Kimura is used to drive all (common) pixels in the LCD panel, any voltage (V0-V10) can be broadly considered as the claimed common voltage. Note that limitation in the specification can't be read into the claim.

### ***Conclusion***

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jimmy H. Nguyen whose telephone number is 571-272-7675. The examiner can normally be reached on Monday - Thursday, 8:00 a.m. - 5:00 p.m..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Bipin Shalwala can be reached at 571-272-7681. The fax phone number for the organization where this application or proceeding is assigned is (571) 273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

JHN  
June 8, 2006



Jimmy H. Nguyen  
Primary Examiner  
Technology Division: 2629